

EXPLANATION

QUATERNARY

Qa

Quaternary alluvium

Qg

Quaternary gravel, sand, fanglomerate, terrace deposits

Ql

Quaternary lake deposits

Pt

Pliocene-Pleistocene nonmarine. Includes: QPck-Kern River fm. (gravel and sand)

QPt

QPt-Tulare (McKivrick) fm. (sandstone, shale, pebble beds)

QPa

QPa-upper most member of Ricardo fm. (gravel, sand, clay)

NON MARINE

Tc

Tertiary undivided nonmarine gravel, sandstone, siltstone, and lacustrine sedimentary rocks.

Pc

Pliocene nonmarine
Pcc-Chance fm. (fanglomerate)
Pcr-Ricardo fm. (sandstone, conglomerate, tuff)

Mc

Miocene nonmarine
Mcb-Beno gravels
Mcbp-Boperta fm. (sandstone, conglomerate)
Mcc-Caliente fm. (claystone, sandstone, conglomerate)
Mcf-Fiss fanglomerate (of Tropic gp.)
Mcg-Gem Hill fm. (of Tropic gp.) (tuff, agglomerate)
Mck-Kimick fm. (undivided)
Mct-Tropic gp. (undivided) (tuff, sandstone, conglomerate)

Og

Oligocene nonmarine. Includes Sespe fm. (sandstone, shale, conglomerate), Tacya fm. (sandstone, shale)
Qcb-Bedville fanglomerate
Qcs-Simmer fm. (conglomerate, sandstone)
Qcw-Walker fm. (sand, shale)
Qcw-Wilnet fm. (conglomerate, sandstone)

Pa

Paleocene nonmarine. Goler fm. (sandstone, fanglomerate, clay)

MARINE

P

Pliocene marine. Includes
Pus-upper Pliocene San Joaquin fm. (clays)
Pml-middle and lower Pliocene Elchegoin fm. (sand, gravel)

Mu

Upper Miocene marine
Mum-McClure shale
Mus-Santa Margarita sandstone and McDonald shale

Mm

Middle Miocene marine. Includes Olcese sand, Round Mountain silt, Freeman silt, Jewett sand.
Mmm-Mariocopa shale

Mi

Lower Miocene marine
Miv-Vaqueros (Temblor) sandstone, Hannah fm. (shale, sandstone)
Mivd-Vedder sand

O

Oligocene marine.
Oel-San Lorenzo fm. (Pleisto and San Emigdio membs.) (shale, sandstone)
Ow-Wagonwheel fm. (sandstone, diatomaceous shale)

E

Eocene marine. E-Juncal shale
Emp-Partway fm. (sandstone, shale)
Et-Tejon fm. (sandy shale, sandstone) (includes Kreyenhagen shale, Point of Rocks sandstone)

Ku

Upper Cretaceous marine. Chico gp. (shale, sandstone, conglomerate)

Kl

Lower Cretaceous marine. Shasta series (Paskenta fm.)

METAMORPHIC ROCKS

Jf

Lower Cretaceous or Jurassic Franciscan gp. (sandstone, shale, chert)
Jub-ultra basic igneous rocks associated with Franciscan gp.

Pu

Paleozoic (?) metamorphic rocks
Pu-undivided schist, quartzite, phyllite, limestone, conglomerate
Pum-undivided but known to contain limestone or dolomite
Pm-Carboniferous (?) Kernville series (schist, phyllite, limestone, quartzite)
Pg-Pompe schist (schist, metavolcanic rocks)
Pg-Pernian (in part) Garlock series (shale, chert, limestone)

Pc

PreCambrian (?) metamorphic rock. pCgn-undifferentiated gneisses
pCm-Mesquite schist
pCp-Palona schist
pCr-Rend schist

Ju

Jurassic-Triassic metavolcanic rocks (metamorphosed andesite, latite, quartz latite)

Pu

Paleozoic meta-andesite, tuff, and chert
Pg-Garlock series volcanic rocks (metamorphosed andesite and basalt)

Sedimentary or intrusive contact, dashed where approximate, dotted where concealed.

Fault, dashed where approximate, dotted where concealed, questioned where inferred, thrust faults barbed on upthrust side.

IGNEOUS ROCKS

Qv

Quaternary basalt (Black Mountain basalt)

Tv

Tertiary volcanic rocks
Tv-undivided
Tv^a-andesite
Tv^r-rhyolite
Tv^b-basalt

Pv

Pliocene volcanic rocks. Pv^a-Ricardo fm. (basalt),
Pv^r-Ricardo fm. (andesite)
Pv^b-Saddle basalt (of Tropic gp.)

Mv

Miocene volcanic rocks
Mv^a-basalt
Mv^b-Basalt quartz latite and rhyolite (of Tropic gp.)

Ov

Oligocene volcanic rocks. Includes basalt and andesite

Cretaceous basic rocks (diortite, gabbro)

Kg

Cretaceous granitic rocks (granite, quartz monzonite, quartz diorite)

ptu

Cretaceous and older undifferentiated rocks (igneous and metamorphic)

Source Data for Geologic Map
For complete reference see text bibliography.

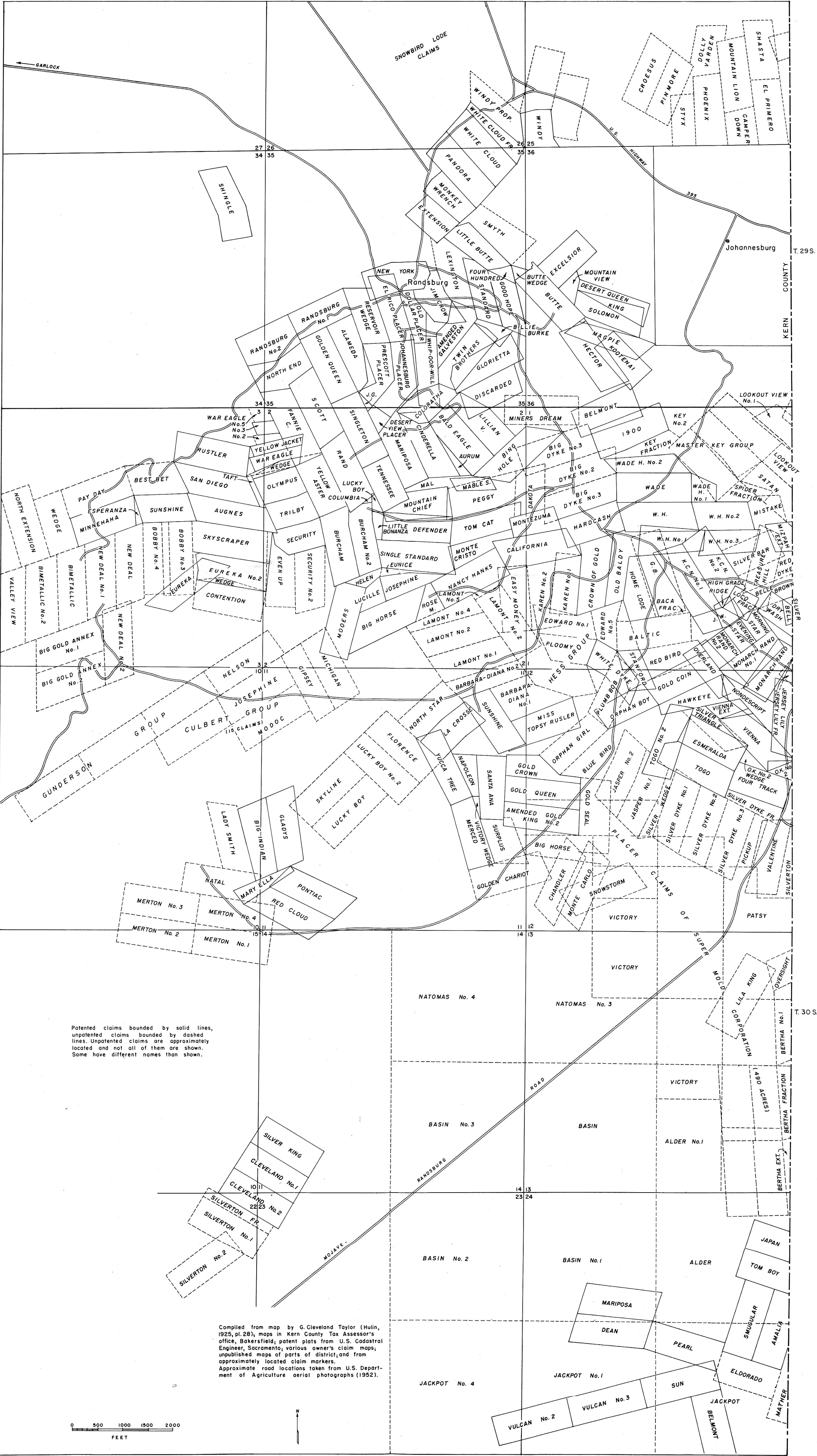
1. Anonymous, 1952.
2. a. Arnold, Ralph and Anderson, Robert, 1908.
b. Arnold, Ralph and Johnson, H.R., 1910.
3. Crowell, J.C., 1952.
4. a. Dibblee, T.W., Jr., 1952.
b. Dibblee, T.W., Jr., and Chesterman, C.W., 1953.
c. Dibblee, T.W., Jr., 1955.
d. Dibblee, T.W., Jr., (unpublished).
e. Dibblee, T.W., Jr., (unpublished).
f. (indicates geology modified by T.W. Dibblee, Jr.).
5. a. English, W.A., 1921.
b. English, W.A., 1918.
6. Heikkila, H.H., and MacLeod, G.M., 1951.
7. Henny, Gerard, 1938.
8. Herrera, L.G. Jr., 1950.
9. Hoots, H.W., 1930.
10. Hudson, F.S., and White, G.H., 1941.
Simonson, R.R., and Krueger, M.L., 1942.
11. Hulin, C.D., 1925.
12. Miller, W.J., and Webb, R.W., 1940.
13. Morton, P.K., and Troxel, B.W., 1959.
14. Pack, R.W., 1920.
15. Peryam, R.C., 1949.
16. Crowell, J.C., 1959.
17. Samsel, Howard, 1951.
18. Troxel, B.W., Gray, C.H., Jr., and Morton, P.K. 1959.
19. Van Couvering, Martin and Allen, H.B., 1943.
20. Wagner, J.P., 1951.
21. Wiese, J.H., 1950.
22. Woodring, W.P., Stewart, Ralph, and Richards, R.W., 1940.

NOTE: Entire map modified after parts of Bakersfield, Los Angeles, San Luis Obispo, and Tona Sheets. Geologic map of California: California Div. Mines, 1955, Kundert, C.J.

GEOLOGIC MAP OF KERN COUNTY
CALIFORNIA

COMPILATION BY
PAUL K. MORTON AND BENNIE W. TROXEL

R. 40 E.

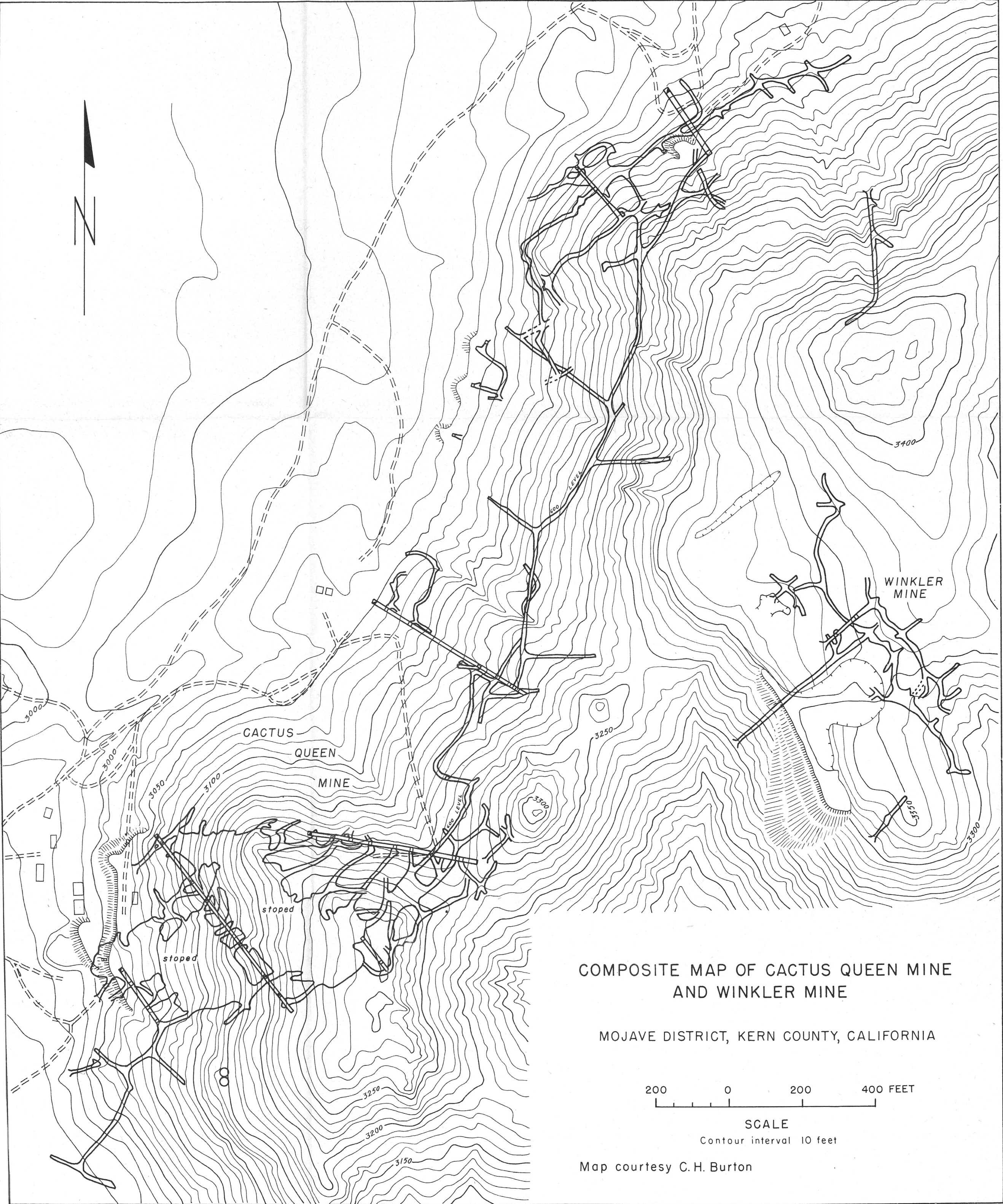


Patented claims bounded by solid lines,
unpatented claims bounded by dashed
lines. Unpatented claims are approximately
located and not all of them are shown.
Some have different names than shown.

Compiled from map by G. Cleveland Taylor (Hulin,
1925, pl. 28), maps in Kern County Tax Assessor's
office, Bakersfield; patent plats from U.S. Cadastral
Engineer, Sacramento; various owner's claim maps;
unpublished maps of parts of district; and from
approximately located claim markers.
Approximate road locations taken from U.S. Depart-
ment of Agriculture aerial photographs (1952).

CLAIM MAP OF PART OF THE RAND DISTRICT,
KERN COUNTY, CALIFORNIA





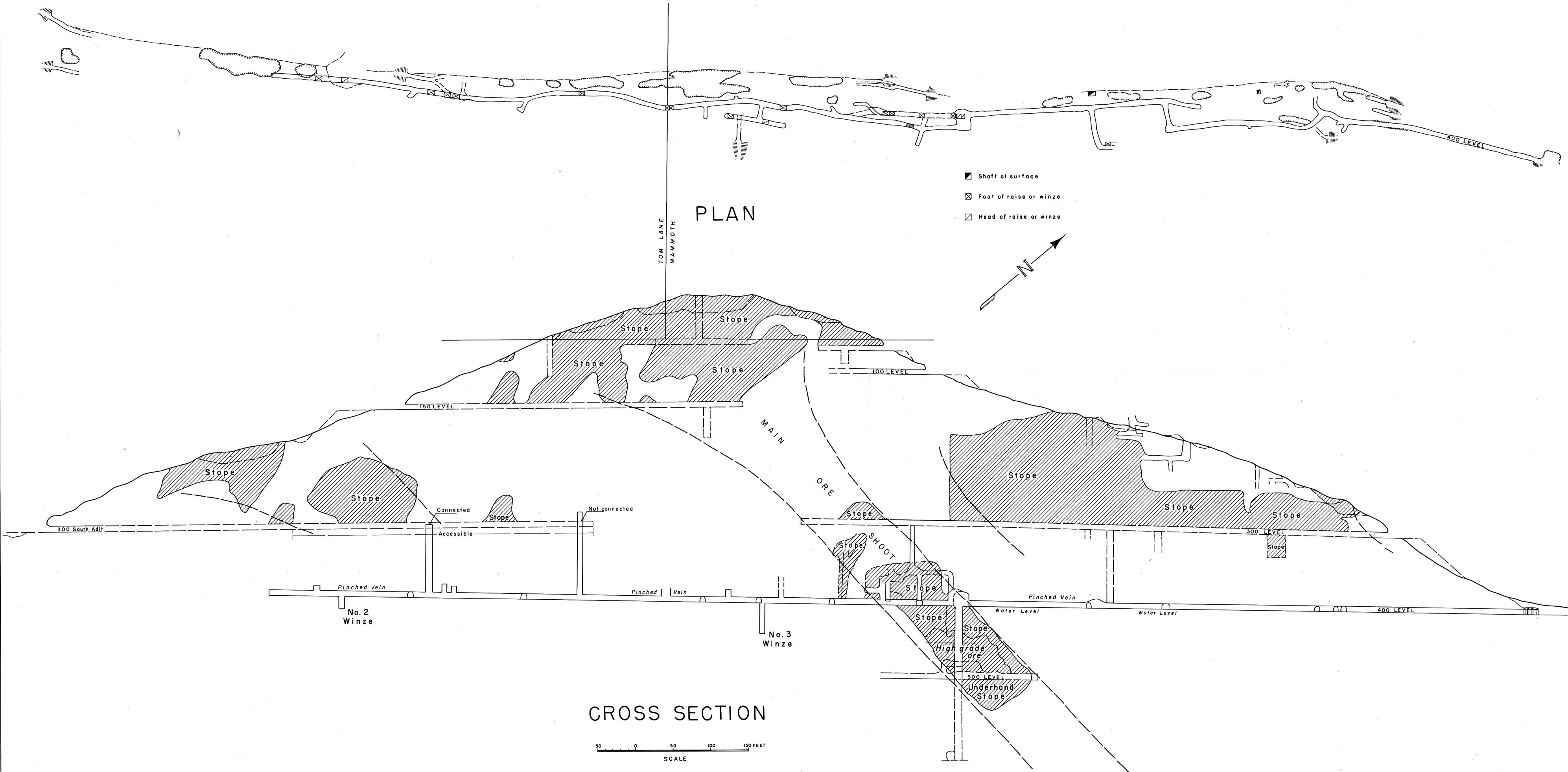


A horizontal number line with tick marks at 0, 100, 200, and 400. The word "FEET" is written below the line.

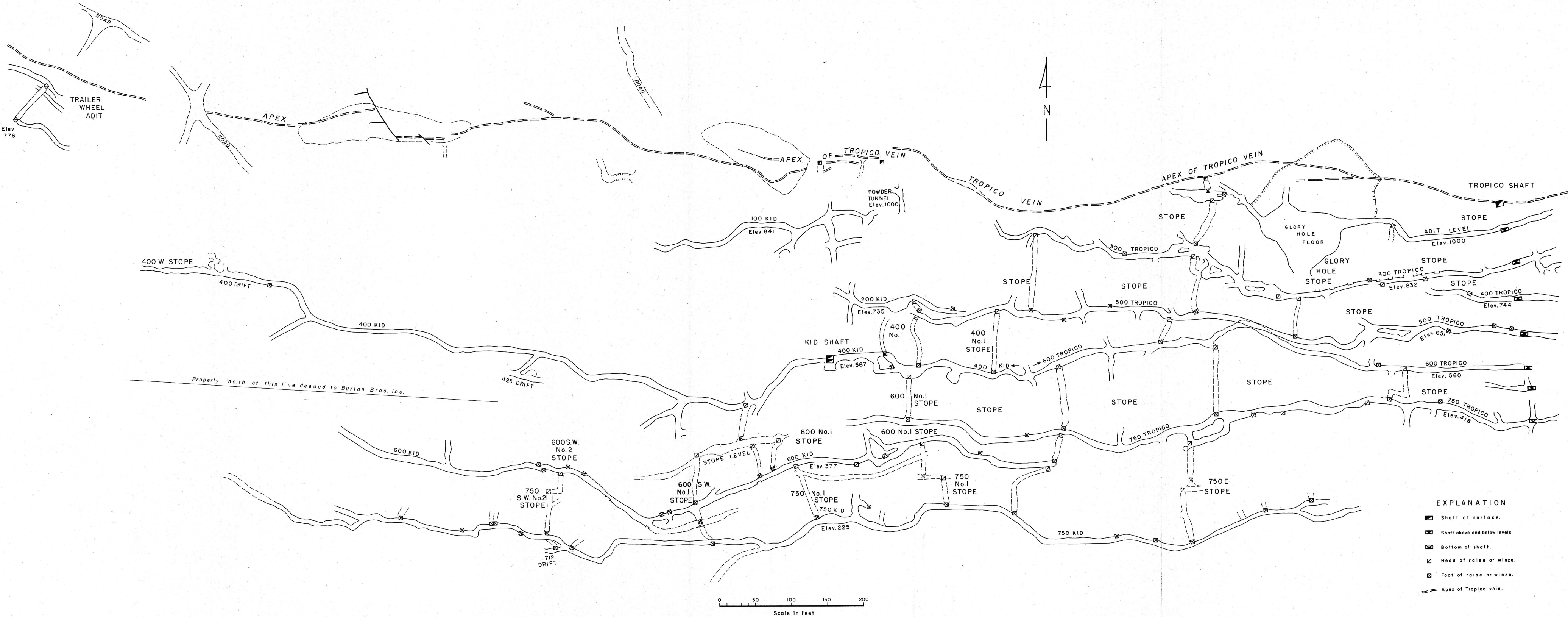


COMPOSITE PLAN OF THE KING SOLOMON MINE, RAND DISTRICT

COMPILED FROM A MAP BY JOHN F. DULING.
GEOLOGY OF PART OF 300-FOOT LEVEL BY DION L. GARDNER.



COMPOSITE PLAN AND LONGITUDINAL SECTION OF THE MAMMOTH MINE, KERN COUNTY, CALIFORNIA



COMPOSITE PLAN OF THE WESTERN PART OF THE HOME VEIN TROPICO MINE

